

FEATURES

- > Easy to install and commission
- > Accuracy of +/- 2%
- > Voltage range: 0 to 10V
- > Low power consumption: ~1.1W
- > On-board data logging of up to 10,000 data points
- Maximum, minimum, average and instantaneous sensors
- > Waterproof polycarbonate enclosure
- > Fully wireless communications
- > Wireless range up to 300m (LoS)
- > Dimensions (LxWxH): 144mm x 112mm x 35mm
- > Self-healing mesh network
- > 2.4GHz ISM band ZigBee® wireless radio
- > Fully secure communications: 128-bit AES encryption
- > Over-the-air software upgrade capability







INTRODUCTION

The ZVO-20 rugged, mains-powered Wireless Voltage Signal Monitor is used to monitor flow rates, pressures, levels, pH or any other energy related output which uses the industry standard 0-10V signal.

The ZVO-20 unit has a reliable on-board main power supply and secure ZigBee wireless mesh communications for easy installation and minimum disruption to normal operations. The unit is housed in a waterproof polycarbonate enclosure and has a wireless range of up to 300m outdoors.

APPLICATIONS

The ZVO-20 can be used to monitor a wide range of analog parameters that relate either directly or indirectly to energy usage in commercial and industrial buildings.

An example of indirect energy usage would be to monitor flow rates in a compressed air line; a high flow rate maintained outside of production hours could indicate a leak in the system or incorrect configuration of the control system. An example of direct energy monitoring via 0-10V voltage signal would be tracking the level of fuel oil in a tank.





Wireless 0-10V Voltage Signal Monitor ZVO-20

SPECIFICATIONS



Dimensions for ZVO-20 Wireless 0-10V Voltage Signal Monitor

Ordering Code	ZVO-20	Wireless 0-10V Voltage Signal Monitor
Voltage Sensor	Voltage Range	0-to 10V
	Accuracy	+/- 2%
	Maximum Voltage	12V
	Maximum Current	75mA
	Sensors	Minimum, maximum, average, instantaneous
Wireless Range	Indoor Range Extension	up to 50m
	Outdoor Range Extension	up to 300m (direct line of sight)
Mains PSU Voltage	Input Voltage Range	75V to 265V AC, 50/60Hz
	Power Consumption	1.1W
Certification	Certification	CE
Security	Encryption	128-bit AES Encryption
Wireless Technology	Radio Technology	ZigBee Pro
	Radio Frequency	2.4 Ghz ISM Band
	Channels	16 Channels (11 - 26)
	Max Tx Power	+3dBm (+5dBm in Boost Mode)
	Rx Sensitivity	-98dBm @ 1% Packet Error Rate
	Data Rate	up to 250 kbits/sec
Physical	Dimensions (LxWxH)	144 x 112 x 35 mm
	Weight	0.35kg
	Mounting	Wall Mounting Flanges
	Enclosure	Polycarbonate Plastic, IP67 rated
Operating Conditions	Operating Temperature	-40°C to +85°C
	Operating Humidity	up to 80% (non-condensing)



